

## REMARKS

### **I. Status of the claims and application**

Claims 26-83, 85, and 93, 96-112, 117-124, 126, 135, 136, and 138 are pending. Claims 26-83 and 85 are withdrawn from consideration. Claims 1-25, 84, 86-92, 94, 95, 113-116, 125, 127-134, 137 were previously canceled without prejudice or disclaimer. Applicants reserve the right to pursue any of the canceled subject matter in one or more continuing applications. Claims 93, 96-112, 117-124, 126, 135, 136, and 138 are under examination.

Applicants amend claims 100, 103, 105, 110 and 135 without prejudice or disclaimer simply to expedite prosecution by deleting the word “entire” from those claims. Specifically, Applicants delete the phrase “entire region of the” from the denoted claims.

### **II. To expedite an allowance, Applicants delete “entire” from the claims**

Claims 93, 96-112, 117-124, 135, 136, and 138 are rejected as allegedly non-enabled, under 35 U.S.C. § 112, first paragraph. The Examiner considers Applicants prior remarks of March 3, 2006, to be “partially persuasive.” Office action at page 4. The specification, the Examiner says, “provides guidance with regard to the generation of a fragment that contains an antibody gene locus.” *Id.* From the Examiner’s point of view, the problem is that “there is no support . . . With regard to the presence of an entire antibody gene locus (as specifically recited in claims 100, 103, for example).” *Id.* According to the Examiner, an “entire gene locus region can encompass upstream, downstream, and non-coding sequences of the locus, for which the specification has neither described, nor provided with guidance to attain.” *Id.* Furthermore, there allegedly is no support as to “how to arrive at attaining [an entire locus].” Office action at page 5. There is no “repeatable method” says the Examiner. *Id.*

While Applicants do not agree with the Examiner’s characterization, they have opted to delete “entire” from claims 100, 103, 105, and 110 , in order to advance this case toward allowance.

In essence, it is unnecessary for grammatical purposes to recite “entire” because that word connotes nothing that otherwise would change the requirements of the revised claims. At the time the present case was filed, after all, the skilled person knew of the location (locus) of antibody genes on human chromosomes.

For instance, see the citation in the specification, in Example 68 at page 233, line 28, to the Human Genome Map (Science, 1994), which describes the location of human antibody genes on human chromosome 14. In addition, the specification at page 64, lines 18 and 19, cites Collins *et al.*, Nature

377: 367-79 (1995) (copy appended), which likewise describes the location of genetic markers on human chromosome 22. Thus, HCF2 is described at page 373 (right side column), and LIF on page 375 (right side column). Also, the antibody genes (IGL---) are located between HCF2 and LIF. Accordingly, the Collins paper discloses the locations of the human antibody  $\lambda$  light chain genes (Ig $\lambda$ ) and associated genetic markers for those genes.

In the same vein, Kuroiwa *et al.*, Nucleic Acids Research 26: 3447-448 (1998), cited in the specification at page 307, lines 6 and 7 (Example 93), discloses the location of the human antibody  $\lambda$  light chain genes and associated genetic markers. See also figure 2 of that Kuroiwa. Weichhold *et al.*, Genomics 16: 512-14 (1993), cited in the specification at page 65, lines 10 and 11, discloses that the human antibody  $\kappa$  light chain gene is located at p11.2 of human chromosome 2 (see abstract), and that CD8 $\alpha$  is adjacent to the telomere side of the human antibody  $\kappa$  light chain gene. See page 512, left column, lines 19-21. Brensing-Küppers *et al.*, Gene 191: 173-181 (1997), also discloses the chromosomal locations for human antibody  $\kappa$  light chain genes.

Accordingly, the loci of the recited antibody genes were disclosed in and were ascertainable from the specification, which in turn drew from what the skilled reader already knew, in light of contemporaneous literature illustrated by publications of record. (Applicants submit with this response copies all of the denoted references in an information disclosure statement.)

### CONCLUSION

In view of the above remarks and amendments, it is respectfully submitted that this application is in condition for allowance. The Examiner is invited contact the undersigned, should he feel that any other issue required further consideration.

Respectfully submitted,

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